

## Work Order ID 59271

Friday, May 28, 2010 10:39:06 AM



Page 1

Item ID: D3908-041

Accept



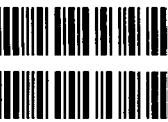
Setup Start



Revision ID:

Item Name: Crosstube Lug Assembly, Aft

Stop



Start Date: 5/28/2010 Start Qty: 1.00



Cust Item ID:



Required Date: 5/28/2010 Req'd Qty: 1.00



Customer:

Reference:

Approvals: Process Plan: MWPDate: 10-5-28

Tooling: \_\_\_\_\_ Date: \_\_\_\_\_

Run Start



QC: \_\_\_\_\_

Date: \_\_\_\_\_

SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Stop

Sequence ID/  
Work Center IDOperation  
DescriptionSet Up/  
Run Hours

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

Draw Nbr	Revision Nbr
D3908	B <u>PC1</u>

100



Pick Kit

0.00

PRELIMINARY ISSUE

Packaging

Memo

0.00

SD 10/05/28

Packaging

PULL FROM STOCK D3908-041  
B 58502 X 1

110



Small Fab

Memo

0.00

EF 10/05/28 ①

Small Fab

REMOVE D3908-1 X 2 AFT X-TUBE LUG PLATE

REPLACE WITH D3908-1 X 2 B 59247  
PRELIMINARY PC1+ hardware to  
add or replace CMF 10-5-28

120

QC  
Quality Control

QC5- Inspect part completeness to step on W/O

0.00

SD 100528

Memo → test fit on  
350 Helicopter→ inspect to P01 Day  
only 8/05/28 ①\* inspect to  
Rev C Day  
8/05/28 ①

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
 Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

**Work Order ID 59271**

Friday, May 28, 2010 10:39:06 AM



Page 2

Item ID: D3908-041

Accept



Setup Start



Revision ID:

Item Name: Crosstube Lug Assembly, Aft

Stop



Start Date: 5/28/2010 Start Qty: 1.00



Cust Item ID:

Required Date: 5/28/2010 Req'd Qty: 1.00



Customer:

Reference:

Approvals:

Process Plan:

Date:

Tooling:

Date:

Run Start



QC:

Date:

SPC (Y/N):

Date:

Stop

Sequence ID/  
Work Center ID

130

Operation  
Description

Identify as per dwg &amp; Stock Location:

Set Up/  
Run Hours

0.00

Tool ID

Tool #

Plan  
CodeAccept  
QtyReject  
QtyReject  
NumberInsp.  
Stamp

Packaging

Packaging

Memo

STK AND ID UNDER NEW BATCH NUMBER

Rev C

pulled on w/o 58320

Prepared (D)

140



QC21- Final Inspection - Work Order Release

0.00

QC

Quality Control

Memo

0.00

Not ready

POSITIVE RECALL

MF  
10-5-28

EFFECTIVE

10-5-28

AUTH

RELEASED

10-5-28

DATE

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

# Picklist Print

Friday, May 28, 2010 10:39:05 AM

Page 1

Work Order ID: 59271



Parent Item: D3908-041



Parent Item Name: Crosstube Lug Assembly, Aft

Start Date: 5/28/2010

Required Date: 5/28/2010

Comments: IPP RevA: New issue DD verified by:EC  
As per Rev B 10-04-06 VERIFIED BY:DD  
10.05.27 DD verf:EC

IPP REV B:  
IPP Rev:C as per PCI

Start Qty: 1.00

Required Qty: 1.00

Component Item ID/ D3908-1	Replacement rev PCI	Mfg/ Manufactured	Bin No	Primary	Last	Route	Unit of Each	Qty on 11.0000	Qty per Kit 2	Total 2	Qty	Date	Status
Lug Plate, Aft Crosstube													

MS20615-4M18	Purchased	No	Location	Loc Qty	Loc Code	
			ST095 58344	11 11	70.0000	MF 10-5-28 6

Rivet	Location	Loc Qty	Loc Code
	ST323 114406	70 70	MF 10-5-28

PTO →

W/O: 59271

## WORK ORDER CHANGES

DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
10-5- 28		ADD D4091-1 B58698 x 1 <del>11111111</del> ADD AN4C13A x 1 Bm114118 ADD MSA1043-4 x 1 <u>m114181</u> . ADD NAS1149 C0432R <u>m114292</u> . x2	MF	10-5- 28			S 10/05/28

Part No: D3908-041 PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date &amp; initial all entries

ITEM	QTY.	P/N	DESCRIPTION
X	D3908-041		X-TUBE LUG ASSY (AFT)
1	1	D2690-6	LANYARD
2	2	D3908-1	AFT X-TUBE LUG PLATE
3	1	D3908-3	STUD RECEIVER LOWER
4	1	D3908-5	EYEBOLT STUD
5	1	D3910-1	X-TUBE LUG
6	1	D4091-1	MOUNTING LUG
7	2	AN3C12A	BOLT
8	1	AN4C13A	BOLT
9	1	MS17984-C413	PIP PIN
10	6	MS20615-4M20	RIVET
11	2	MS21043-3	NUT
12	1	MS21043-4	NUT
13	4	NAS1149C0332R	WASHER
14	2	NAS1149C0432R	WASHER

PC1

PC1

PC1

PC1

8 7 6 5 4 3 2 1

D C B A

**D3908-041 X-TUBE LUG ASSY (AFT)**

**PRELIMINARY ISSUE**  
10.05.27

NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: N/A
- 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3908-041" USING FINE POINT PERMANENT INK MARKER
- 7) WEIGHT: 2.34 lbs
- 8) ATTACH TO D3908-1 BY LOOPING AROUND LIGHTENING HOLE FIRST AND THEN SECURE TO MS17984-C413 PIP PIN'S RING.

8 7 6 5 4 3 2 1

D C B A

**PC1** REVISED ITEM #2; ITEM #6 REPLACES QTY 1 ITEM #5;  
#7 FOR ITEMS #7 & 11 WAS QTY 4, QTY 8 FOR ITEM #13 WAS 4. ADDED ITEMS #8, 12 & 14

**B** BOM: D3909-5 REPLACED WITH D3908-5. QTY 1 ADDED: D2690-6 & MS17984-C413. SHEET 5: ADDED D3908-5

**A** NEW ISSUE

**REV.** **DESCRIPTION** **BY** **DATE**

**DESIGN** **JPH** **DART AEROSPACE LTD**  
**DRAWN** **HAWKESBURY, ONTARIO, CANADA**

**CHECKED** **DRAWING NO.** **REV. PC1**  
**MFG. APPR.** **D3908** **SHEET 1 OF 5**

**APPROVED** **TITLE** **SCALE**  
**DE APPR.** **X-TUBE LUG ASSY (AFT)** **NTS**

**DATE** **10.05.27**

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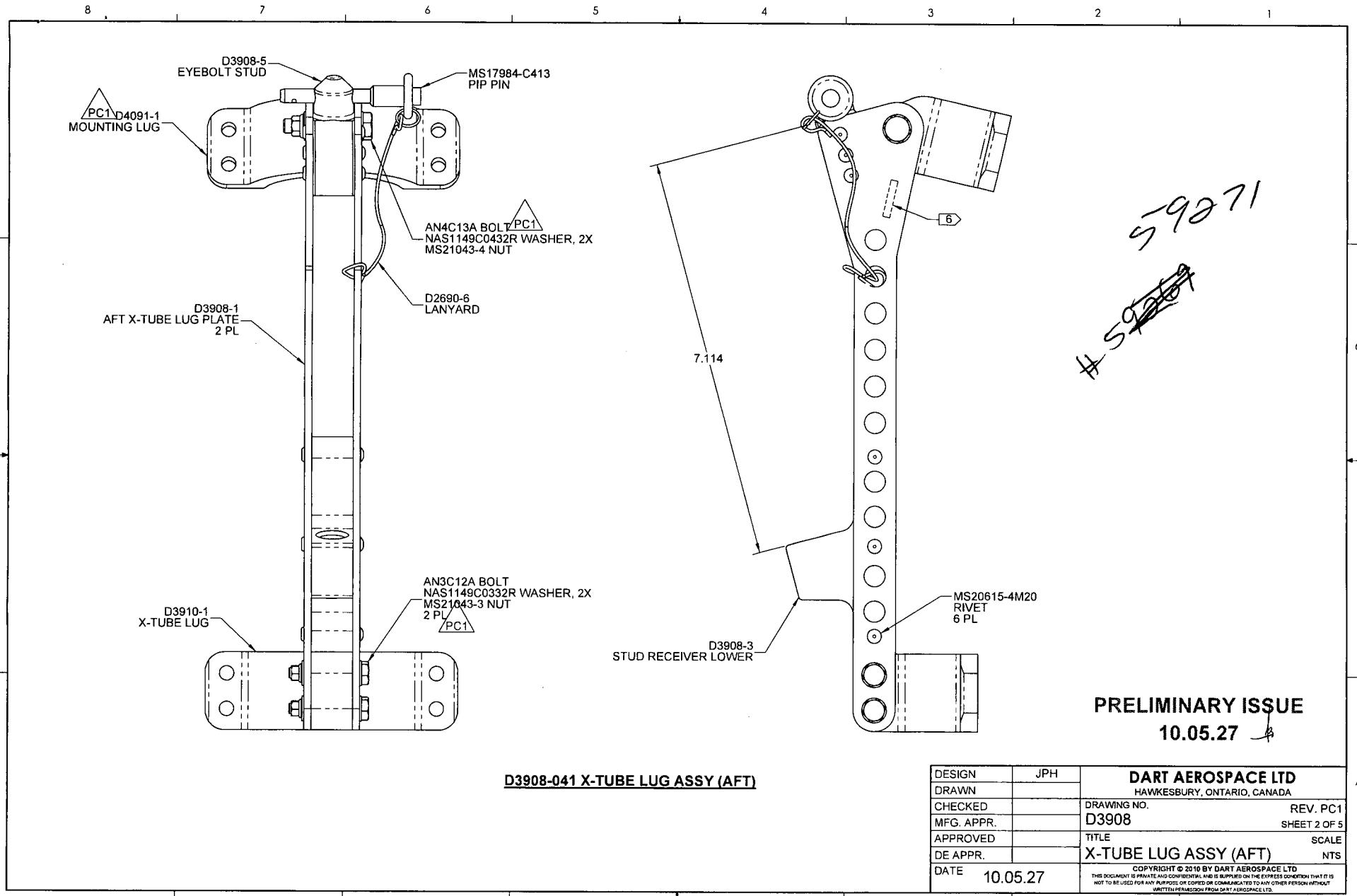
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DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries



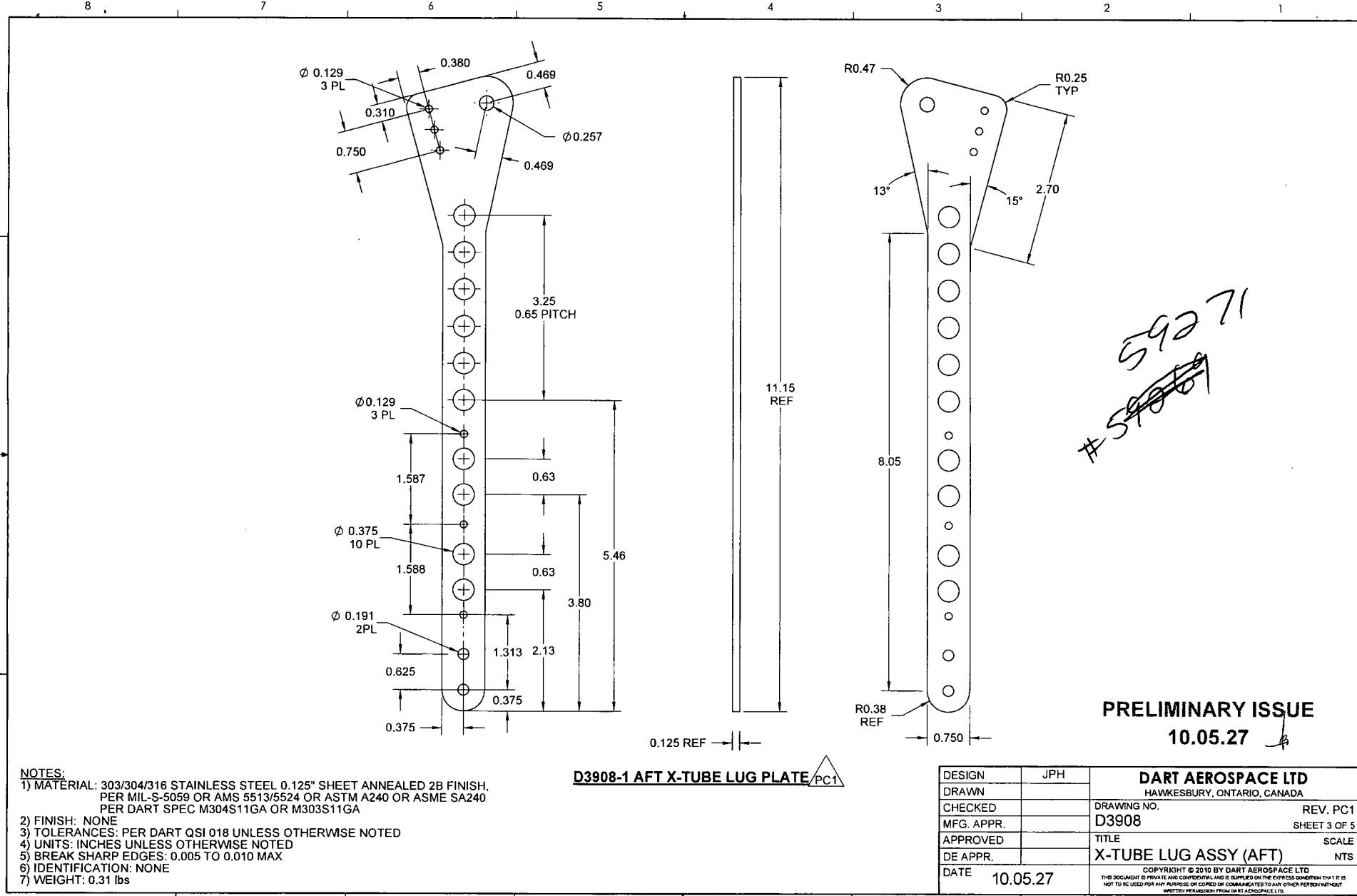
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DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

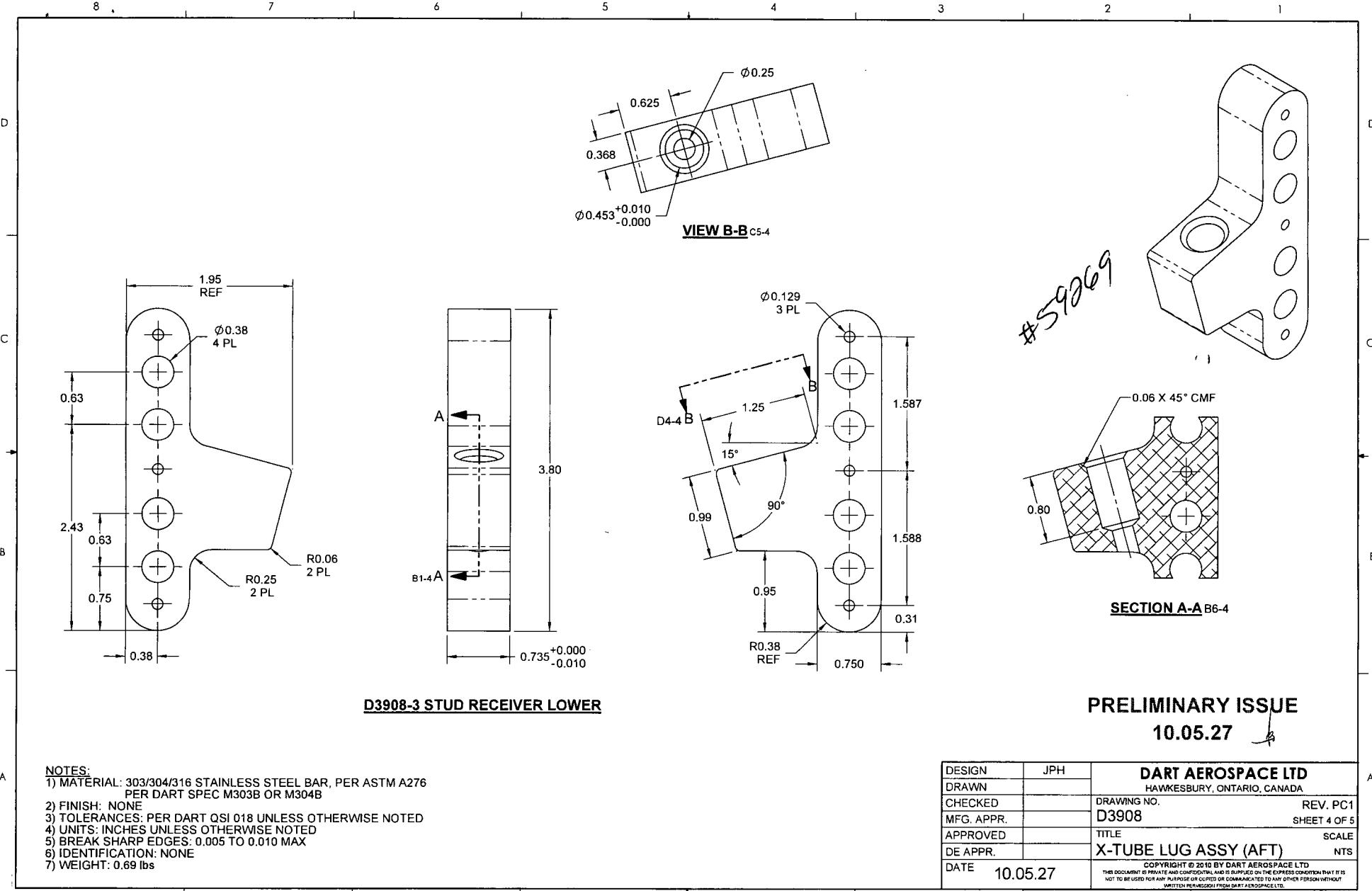


W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval, Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
 Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries



W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_

Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

8 7 6 5 4 3 2 1

D

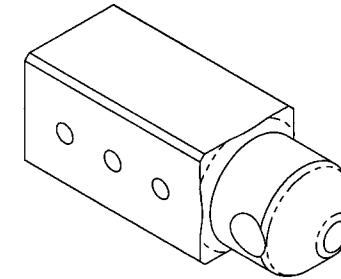
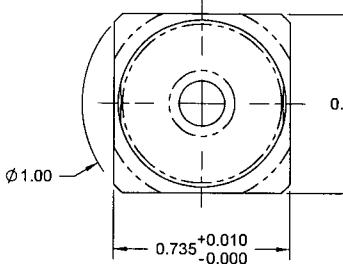
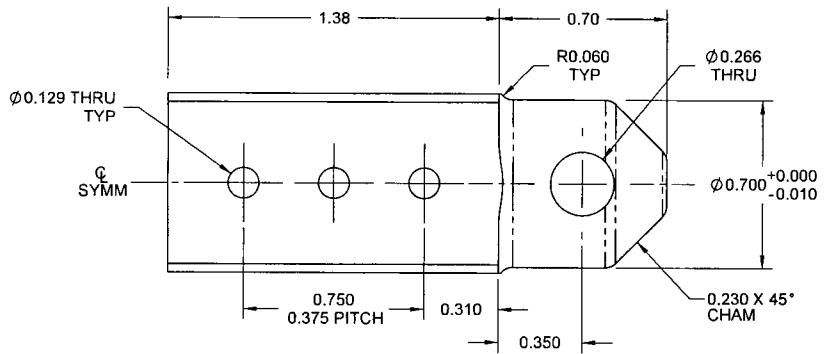
D

C

C

B

B



5927  
5926

D3908-5 EYEBOLT STUD**PRELIMINARY ISSUE****10.05.27****NOTES:**

- 1) MATERIAL: 303/304/316 STAINLESS STEEL ROUND BAR, PER ASTM A276 OR ASTM A582  
PER DART SPEC M303R OR M304R
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX
- 6) IDENTIFICATION: NONE
- 7) WEIGHT: 0.26 lbs

DESIGN	JPH	<b>DART AEROSPACE LTD</b>	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO. REV. PC1	
MFG. APPR.		D3908 SHEET 5 OF 5	
APPROVED		TITLE SCALE	
DE APPR.		NTS	
DATE	10.05.27	X-TUBE LUG ASSY (AFT)	

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8 7 6 5 4 3 2 1

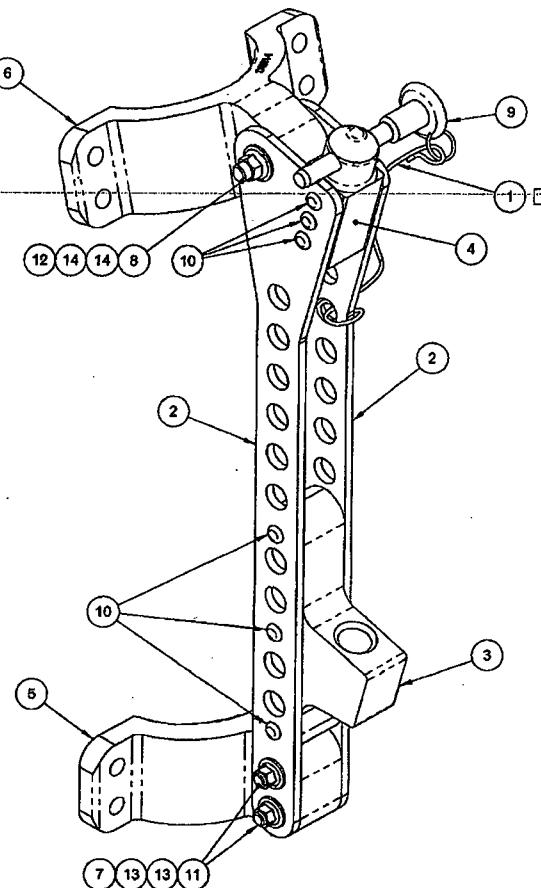
W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
 Resolution: \_\_\_\_\_ Disposition: \_\_\_\_\_ QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

ITEM	QTY.	P/N	DESCRIPTION
X	1	D3908-041	X-TUBE LUG ASSY (AFT)
1	1	D2690-6	LANYARD
2	2	D3908-1	AFT X-TUBE LUG PLATE
3	1	D3908-3	STUD RECEIVER LOWER
4	1	D3908-5	EYEBOLT STUD
5	1	D3910-1	X-TUBE LUG
6	1	D4091-1	MOUNTING LUG
7	2	AN3C12A	BOLT
8	1	AN4C13A	BOLT
9	1	MS17984-C413	PIP PIN
10	6	MS20615-4M20	RIVET
11	2	MS21043-3	NUT
12	1	MS21043-4	NUT
13	4	NAS1149C0332R	WASHER
14	2	NAS1149C0432R	WASHER



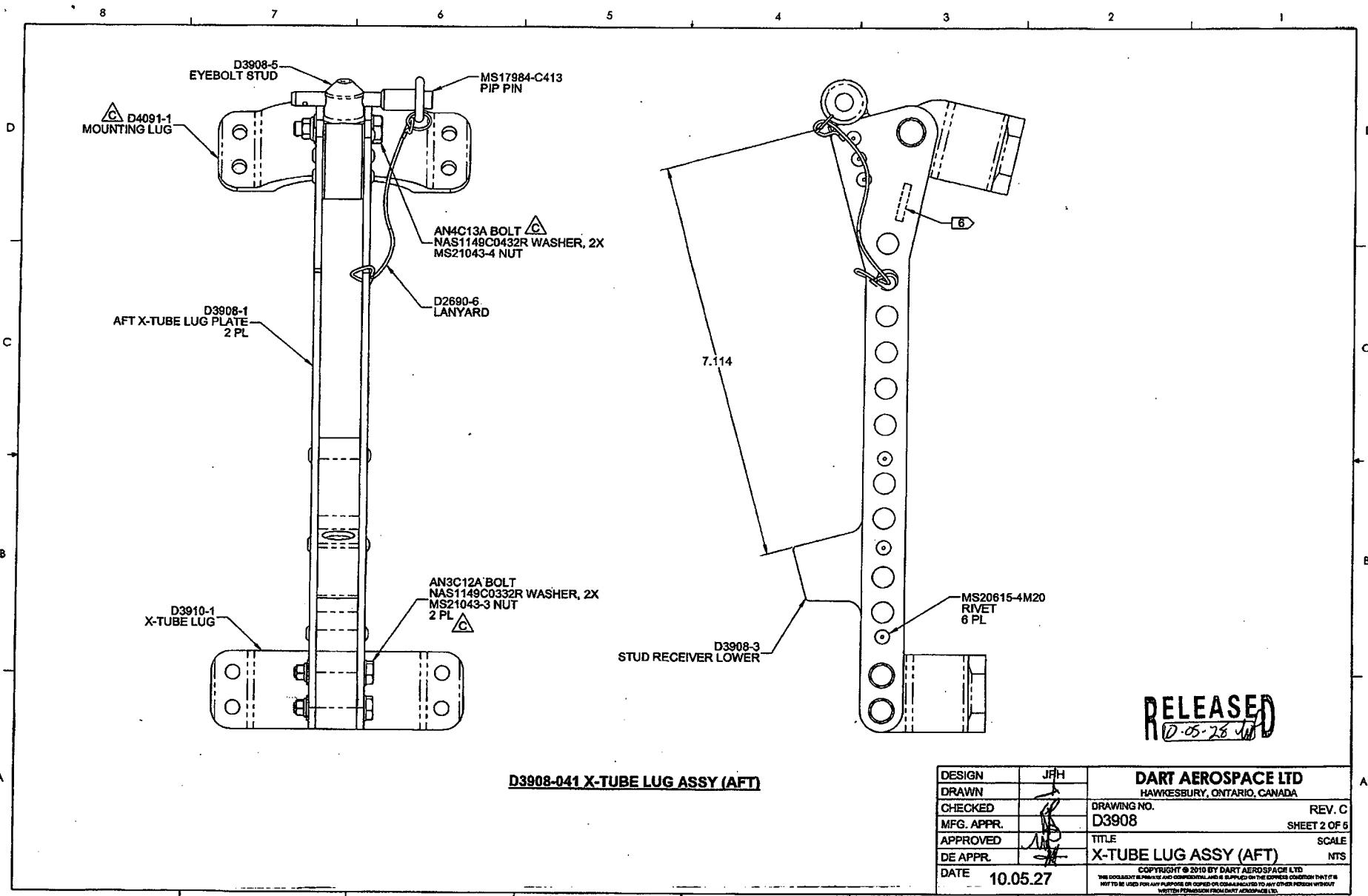
D3908-041 X-TUBE LUG ASSY (AFT)

NOTES:  
 1) MATERIAL: N/A  
 2) FINISH: NONE  
 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED  
 4) UNITS: INCHES UNLESS OTHERWISE NOTED  
 5) BREAK SHARP EDGES: N/A  
 6) IDENTIFICATION: IDENTIFY WITH DART P/N "D3908-041" USING FINE POINT PERMANENT INK MARKER  
 7) WEIGHT: 2.34 lbs  
 8) ATTACH TO D3908-1 BY LOOPING AROUND LIGHTENING HOLE FIRST AND THEN SECURE TO MS17984-C413 PIP PIN'S RING.

C	REDESIGNED ITEM #2: ITEM #8 REPLACES QTY 1 ITEM #5; QTY 2 FOR ITEMS #7 & 11 WAS QTY 4; QTY 8 FOR ITEM #13 WAS 4; ADDED ITEMS #8, 12 & 14	MB	10.05.27
B	BOOM: D3909-5 REPLACED WITH D3908-5. QTY 1 ADDED: D2690-6 & MS17984-C413. SHEET 5: ADDED D3908-5	JPH	10.04.08
A	NEW ISSUE	JPH	10.03.04
REV.	DESCRIPTION	BY	DATE
DESIGN	JPH	DART AEROSPACE LTD	
DRAWN		HAWKESBURY, ONTARIO, CANADA	
CHECKED		DRAWING NO.	REV. C
MFG. APPR.		D3908	SHEET 1 OF 5
APPROVED		TITLE	SCALE
DE APPR.		X-TUBE LUG ASSY (AFT)	
DATE	10.05.27	NTS	

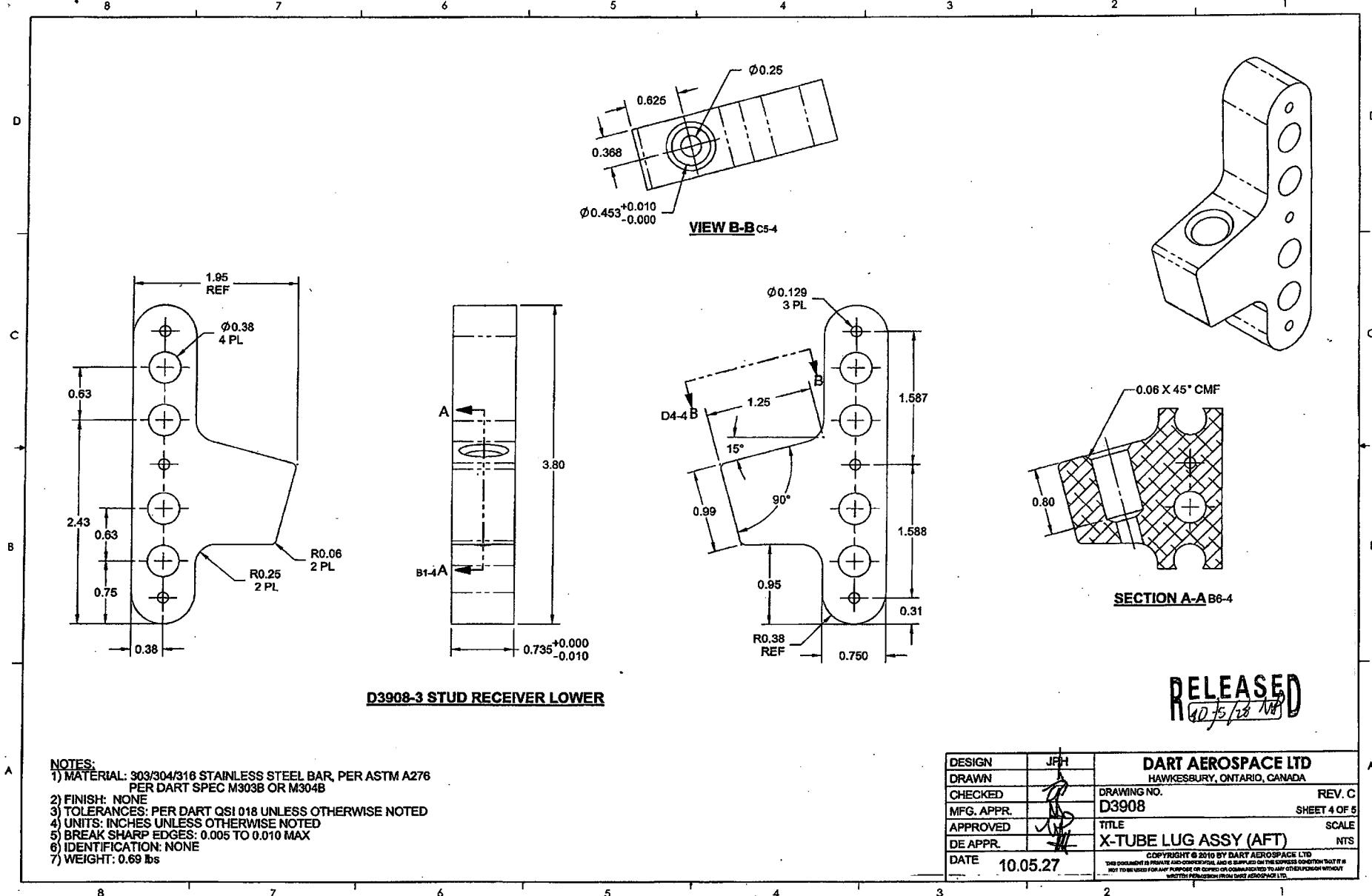
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 0-05-28/10



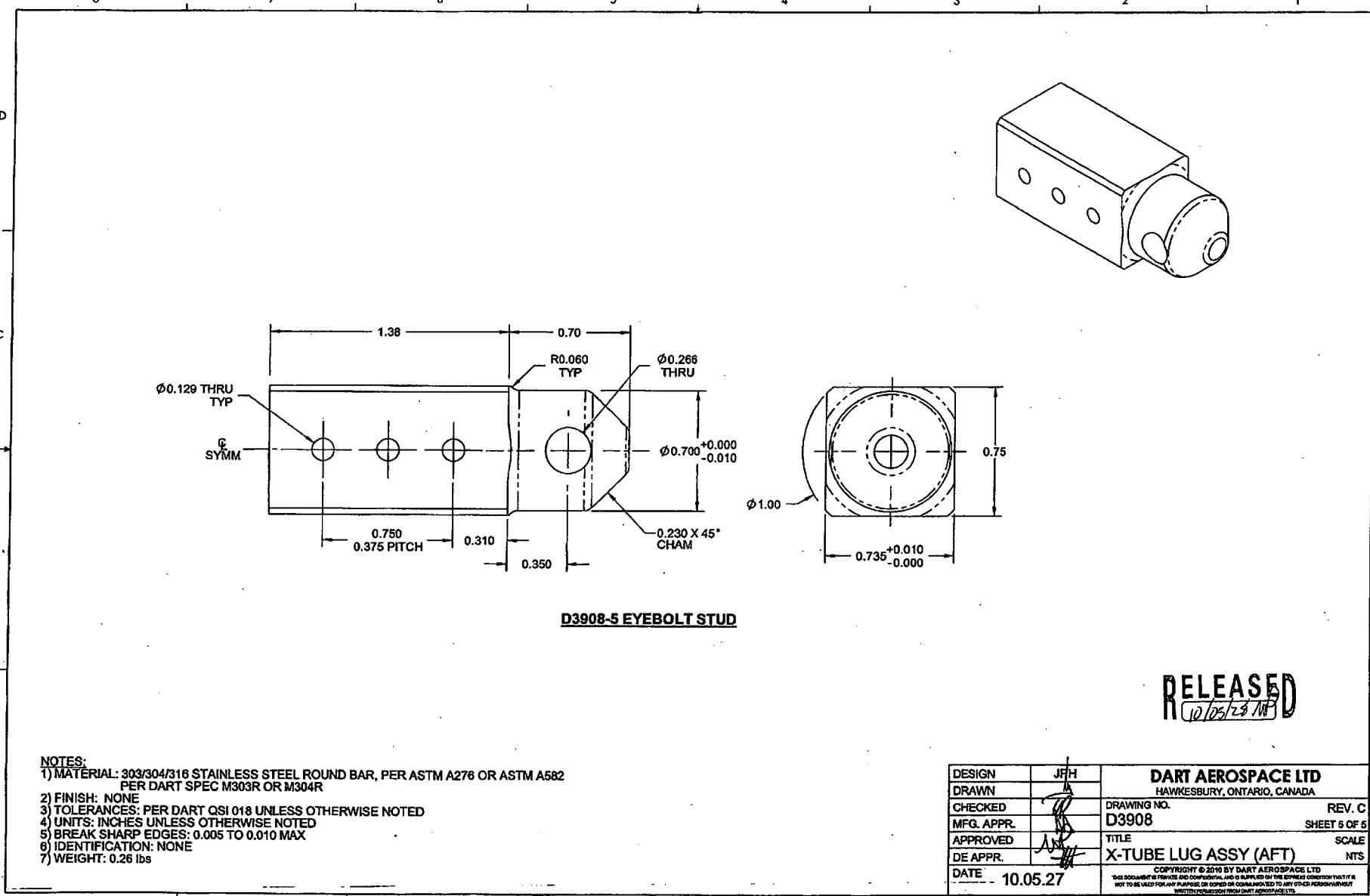
DESIGN	JFH	DART AEROSPACE LTD
DRAWN		HAWKESBURY, ONTARIO, CANADA
CHECKED		DRAWING NO.
MFG. APPR.		D3908
APPROVED		REV. C
DE APPR.		SHEET 2 OF 5
DATE	10.05.27	TITLE
		X-TUBE LUG ASSY (AFT)
		SCALE
		NTS

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DRAWN	✓	HAWKESBURY, ONTARIO, CANADA	
CHECKED	✓	REV. C	
MFG. APPR.	✓	DRAWING NO. D3908	
APPROVED	✓	SHEET 4 OF 5	
DE APPR.	✓	TITLE X-TUBE LUG ASSY (AFT)	
DATE	10.05.27	SCALE NTS	

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DRAWN	M	HAWKESBURY, ONTARIO, CANADA	
CHECKED		REV. C	
MFG. APPR.		DRAWING NO. D3908	
APPROVED		SHEET 5 OF 5	
DE APPR.		TITLE X-TUBE LUG ASSY (AFT)	
DATE	10.05.27	SCALE NTS	

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